

Amendments to the Claims

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claims 1-5 (Cancelled)

6. (Previously Presented) A modified Staphylococcal enterotoxin B (SEB) having a reduced reactivity with a neutralizing antibody to SEB (anti-SEB antibody), wherein the amino acid sequence from residue position 226 to residue position 229 in the amino acid sequence of SEB as shown in SEQ ID NO:1 is Ala Thr Thr Gln.

7. (Previously Presented) A modified Staphylococcal enterotoxin B (SEB) having a reduced reactivity with a neutralizing antibody to SEB (anti-SEB antibody), wherein the amino acid sequence from residue position 226 to residue position 229 in the amino acid sequence of SEB as shown in SEQ ID NO:1 is Lys Arg Ile Ile.

8. (Previously Presented) A modified Staphylococcal enterotoxin B (SEB) having a reduced reactivity with a neutralizing antibody to SEB (anti-SEB antibody), wherein Asn at

residue position 23 in the amino acid sequence of SEB as shown in
SEQ ID NO: 1 is substituted with Tyr.

Claims 9-15. **(Cancelled)**

16. **(Previously Presented)** The modified SEB of claim 6,
wherein Asn at residue position 23 in the amino acid sequence of
SEB as shown in SEQ ID NO: 1 is substituted with Tyr.

17. **(Previously Presented)** The modified SEB of claim 7,
wherein Asn at residue position 23 in the amino acid sequence of
SEB as shown in SEQ ID NO: 1 is substituted with Tyr.

Claims 18-20 **(Cancelled)**.

21. **(Currently Amended)** A modified Staphylococcal
enterotoxin B (SEB), having a reduced reactivity with a
neutralizing antibody to SEB (anti-SEB antibody), and capable of
being expressed in a soluble form in *Escherichia coli* so as to be
maintained stably in an aqueous solution and which modified SEB
retains a therapeutic effect to rheumatoid arthritis-immunopathy
~~equivalent to that of naturally occurring SEB,~~

wherein the reactivity with anti-SEB antibody is reduced
as a result of amino acid substitution at residue positions 226 to
229 of SEQ ID NO: 1, with the amino acid sequence at residue

Appln. No. 10/551,263
Amd. dated September 29, 2010
Reply to Office Action of March 31, 2010

positions 226 to 229 of SEQ ID NO:1 being substituted with Ala Thr Thr Gln, respectively, or substituted with Lys Arg Ile Ile, respectively, and

wherein Asn at residue position 23 of SEQ ID NO:1 is substituted with Tyr.

Claim 22 (Cancelled)

23. (Withdrawn) In a method for the treatment of rheumatoid arthritis comprising administration to a patient in need thereof an effective amount of a treatment agent, the improvement wherein

the treatment agent comprises the modified SEB of claim 21.